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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/719,028	11/24/2003	Masao Nakagawa	031290	9157	
	7590 08/07/2007 TOS & HANSON, LLP		EXAM	IINER	
1420 K Street, N.W.			GESESSE, TILAHUN		
Suite 400 ´ . WASHINGTON, DC 20005			ART UNIT	PAPER NUMBER	
			2618		
			MAIL DATE	DELIVERY MODE	
•			08/07/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

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		Application No.	Applicant(s)		
		10/719,028	NAKAGAWA, MASAO		
	Office Action Summary	Examiner	Art Unit		
		Tilahun B. Gesessse	2618		
Period fe	The MAILING DATE of this communication app or Reply	pears on the cover sheet with the	e correspondence address		
WHIC - Exte after - If NC - Failt Any	CHEVER IS LONGER, FROM THE MAILING DATES OF THE MAI	ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be will apply and will expire SIX (6) MONTHS from the cause the application to become ABANDO	ON. It timely filed om the mailing date of this communication. NED (35 U.S.C. § 133).		
Status					
1)⊠	Responsive to communication(s) filed on 22 M	<u>ay 2007</u> .			
2a) <u></u> ☐	This action is FINAL . 2b)⊠ This action is non-final.				
3)[☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is				
	closed in accordance with the practice under E	Ex parte Quayle, 1935 C.D. 11,	453 O.G. 213.		
Disposit	ion of Claims				
4)⊠	Claim(s) <u>1-4</u> is/are pending in the application.				
	4a) Of the above claim(s) is/are withdraw	wn from consideration.			
5)	Claim(s) is/are allowed.				
6)⊠	Claim(s) <u>1-4</u> is/are rejected.				
7)	Claim(s) is/are objected to.				
8)[_]	Claim(s) are subject to restriction and/or	r election requirement.			
Applicat	ion Papers				
9)[The specification is objected to by the Examine	r.			
10)	The drawing(s) filed on is/are: a) acce	epted or b)□ objected to by the	e Examiner.		
	Applicant may not request that any objection to the	drawing(s) be held in abeyance. S	See 37 CFR 1.85(a).		
_	Replacement drawing sheet(s) including the correct		•		
11)	The oath or declaration is objected to by the Ex	aminer. Note the attached Office	ce Action or form PTO-152.		
Priority :	under 35 U.S.C. § 119				
•	Acknowledgment is made of a claim for foreign All b) Some * c) None of: 1. Certified copies of the priority documents 2. Certified copies of the priority documents	s have been received.			
	3. Copies of the certified copies of the prior	• •			
	application from the International Bureau	u (PCT Rule 17.2(a)).			
* (See the attached detailed Office action for a list	of the certified copies not recei	ved.		
Attachmer	• •	_			
	ce of References Cited (PTO-892) ce of Draftsperson's Patent Drawing Review (PTO-948)	4) 🔲 Interview Summa Paper No(s)/Mail			
3) 🔲 Infor	rmation Disclosure Statement(s) (PTO/SB/08) er No(s)/Mail Date	5) Notice of Informa 6) Other:			

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DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on May 22, 2007 has been entered.

Claim Rejections - 35 USC § 103

- 2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claims 1-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Santhoff (US 20040002346) in view of Weaver, Jr. et al (6,108,364).
- Claim 1, Santhoff teaches a UWB repeater (see page 7,paragraph 0079, lines 7-11 and figure 13) in which UWB units 1110 relays information to UWB requesting unit 1105, comprising:

Santhoff teaches a receiver for receiving UWB pulse signals (see page 6, Paragraph 0071 and figure 19) in which the Santhoff pulses are considered to be in series being received by the receiver.

Santhoff teaches a transmitter for transmitting UWB pulse signals (see page 6,

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paragraph oo71 and figure 20) in which relay 1110 transmits pulses of signals, considered in series, as disclosed by Santhoff.

Santhoff teaches transmitting timing different from the receiving timing by a pulse unit in order to prevent a sneak path wave between the receiver and the transmitter (see page 6, paragraph 0071) in which superposition pulsed or adjacent pulse ignore by the receiver to decrease interfering pulse and transmission can be postponed or delay acknowledging response.

Santhoff does not expressly teach a relay controller. However, Weaver teaches a repeater that delay the received signal by predetermined amount (see abstract and figure 3).

It would have been obvious to one of ordinary skill in the art at the time of the invention was made to utilize a relay control, such as delay and switching technique, for controlling the receive and transmit adjacent signals, as taught by Weaver, in order to provide a greater amount of isolation between transmitting and receiving signals (see column 6, lines 46-51 and column 9, lines 49-52).

Claim 2, Santhoff does not expressly teach a relay controller. However, Weaver teaches a repeater that delay the received signal by predetermined amount (see abstract and figure 3).

It would have been obvious to one of ordinary skill in the art at the time of the invention was made to utilize a relay control, such as delay and switching technique, for controlling the receive and transmit adjacent signals, as taught by Weaver, in order to provide a greater amount of isolation between transmitting and receiving signals (see column 6, lines 46-51 and column 9, lines 49-52).

Claim 3, Santhoff does not expressly teach a relay controller. However, Weaver

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teaches a repeater that delay the received signal by predetermined amount (see abstract and figure 3).

It would have been obvious to one of ordinary skill in the art at the time of the invention was made to utilize a relay control, such as delay and switching technique, for controlling the receive and transmit adjacent signals, as taught by Weaver, in order to provide a greater amount of isolation between transmitting and receiving signals (see column 6, lines 46-51 and column 9, lines 49-52).

Claim 4 Santhoff teaches a UWB communication system (see page 7,paragraph 0079, lines 7-11 and figure 13) in which UWB units 1110 relays information to UWB requesting unit 1105, comprising:

Santhoff teaches a receiver for receiving UWB pulse signals (see page 6, paragraph 0071 and figure 19) in which the Santhoff pulses are considered to be in series being received by the receiver.

Santhoff teaches a transmitter for transmitting UWB pulse signals (see page 6, paragraph oo71 and figure 20) in which relay 1110 transmits pulses of signals, considered in series, as disclosed by Santhoff.

Santhoff teaches transmitting timing different from the receiving timing by a pulse unit in order to prevent a sneak path wave between the receiver and the transmitter (see page 6, paragraph 0071) in which superposition pulsed or adjacent pulse ignore by the receiver to decrease interfering pulse and transmission can be postponed or delay acknowledging response.

Santhoff does not expressly teach a relay controller. However, Weaver teaches a repeater that delay the received signal by predetermined amount (see abstract and figure 3).

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It would have been obvious to one of ordinary skill in the art at the time of the invention was made to utilize a relay control, such as delay and switching technique, for controlling the receive and transmit adjacent signals, as taught by Weaver, in order to provide a greater amount of isolation between transmitting and receiving signals (see column 6, lines 46-51 and column 9, lines 49-52).

Conclusion

4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tilahun B Gesesse whose telephone number is 571-272-7879. The examiner can normally be reached on flexible schedule.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Edward Urban can be reached on 571-272-7899.

The Central FAX Number is 571-273-8300. For patent related correspondence, hand carry deliveries must be made to the Customer Service Window (now located at the Randolph Building, 401 Dulany Street, Alexandria, VA 22314), and facsimile transmissions must be sent to the Central FAX number.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR

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system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

TG

August 2, 2007

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